

AMENDMENTS TO THE SPECIFICATION

Please delete the section entitled SUMMARY OF THE INVENTION, beginning at page 3 of the specification, and ending at page 18 prior to the section entitled BRIEF DESCRIPTION OF THE DRAWINGS, with the following:

SUMMARY OF THE INVENTION

In view of the above-described problems, it is an object of the present invention to provide an apparatus which makes it possible to efficiently perform the cup attaching operation by facilitating the alignment for attaching the cup without performing the marking operation on the subject lens, and which makes it possible to easily confirm processability.

To attain the above-noted object, the present invention provides the following.

A cup attaching apparatus having an attaching device with a reference axis to attach a cup as a processing jig to a subject lens along the reference axis; an illuminating device for illuminating the lens and an index plate having an index of a predetermined pattern by rays of light shaped into a diameter larger than a diameter of the lens. The cup attaching apparatus further includes a screen for projecting an image of the lens and an image of the index which are formed by the illuminating device; an imaging device for picking up the images projected onto the screen; an optical-center detecting device for obtaining a position of an optical center of the lens by processing the index image picked up by the imaging device; and a display device for displaying in a superposed manner information on the position of the optical center obtained by the optical-center detecting device and the lens image picked up by the imaging device. In the above cup attaching apparatus, attachment of the cup to the lens is effected by alignment while observing display by the display device.

The present invention also provides a cup attaching apparatus having an attaching device having a reference axis to attach a cup as a processing jig to a subject lens along the reference axis. The cup attaching apparatus further includes an illuminating device for illuminating the lens and an index plate having an index of a predetermined pattern; an index detecting device for detecting an image of the index formed by the illuminating device; an optical-center detecting device for obtaining a position of an optical center of the lens with respect to the reference axis on the basis of a result of detection by the index detecting device; and a position storing device for storing information on the position of the optical center obtained by the optical-center detecting device when the cup is attached to the lens by the attaching device. In the foregoing cup attaching apparatus, the information on the position of the optical center stored by the position storing device is used as information on correction at the time of processing by an eyeglass lens processing apparatus.

The present invention also provides a cup attaching apparatus for attaching a cup onto an eyeglass lens, the cup being adapted to fix the eyeglass lens onto a lens rotating shaft of a lens processing apparatus. The cup attaching apparatus has a cup attaching device for moving the cup to the lens placed at a predetermined position, and attaching the cup onto the lens; a detecting device, provided with a measurement optical system having a measurement light source, a measurement index plate and a photoelectric detector, for detecting a position of an optical center of the lens and a direction of a cylinder axis of the lens; a cylinder axis instructing device for instructing a direction of the cylinder axis of the lens; and a display device for displaying a reference mark indicating a predetermined reference position, and an optical center mark and a

cylinder axis mark both based on a result of detection by the detecting device, the optical center mark indicating the position of the optical center of the lens with respect to the predetermined reference position, the cylinder axis mark indicating the direction of the cylinder axis of the lens with respect to the instructed direction of the cylinder axis.

Other objectives and features of the invention will become evident in the course of the description thereof, which follows.